

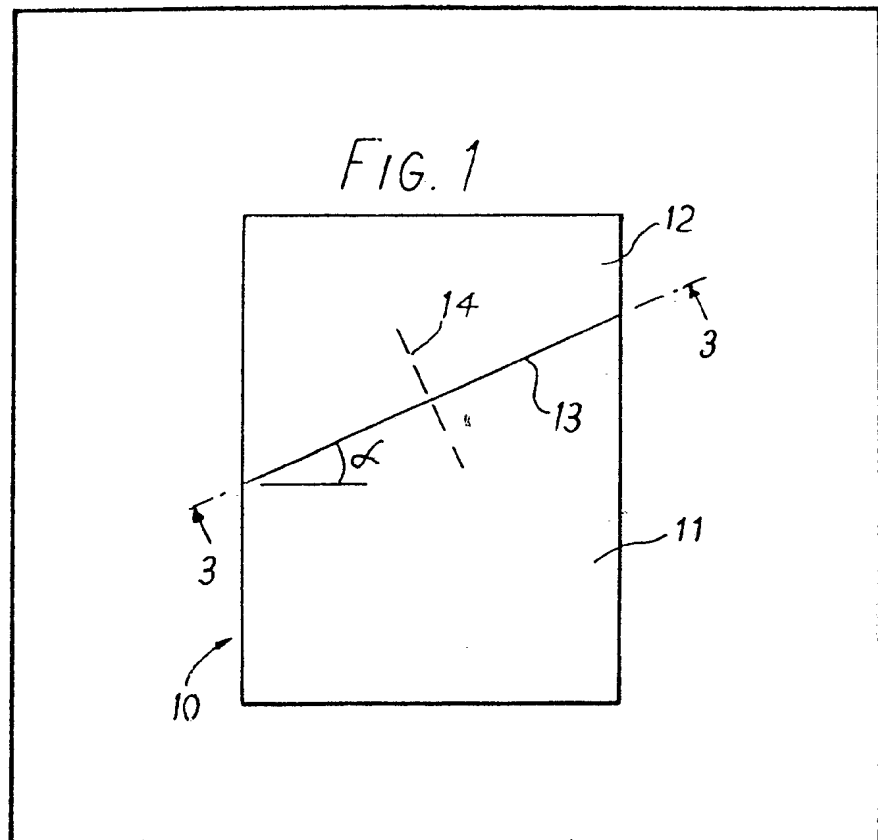
(12) **UK Patent Application** (19) **GB** (11) **2 026 675 A**

(21) Application No **7925502**  
(22) Date of filing **20 Jul 1979**  
(23) Claims filed **20 Jul 1979**  
(30) Priority data  
(31) **7831232**  
(32) **26 Jul 1978**  
(33) **United Kingdom (GB)**  
(43) Application published  
**6 Feb 1980**  
(51) **INT CL<sup>3</sup>**  
**F21V 21/30**  
(52) Domestic classification  
**F4R 254 41Y MG**  
(56) Documents cited  
**GB 1380338**  
**GB 1368289**  
**GB 1209952**  
**GB 261527**  
(58) Field of search  
**F4R**  
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(54) **Improvements Relating to**  
**Lanterns and Other Lights**

(57) A lantern, torch or other lamp has a body portion 11 and a light-emitting portion 12 housing a reflector encircling a bulb which is carried in a holder attached to the reflector, and the light emitting portion is mounted for rotation relative to the body portion about an axis 14 which is inclined relative to the axis of

symmetry of the reflector. In a preferred construction both of said portions are generally cylindrical and, at least in the region adjoining the joint section where the two portions are connected together, are of elliptical cross-section. The joint section is circular and its plane 13 is inclined to the lengthwise axes of the two portions at the same angle. Rotation of the light emitting portion thus alters the direction in which the beam is directed.



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FIG. 1

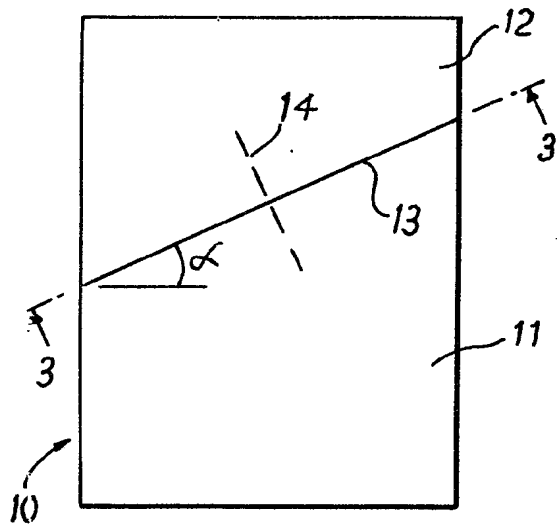


FIG. 2

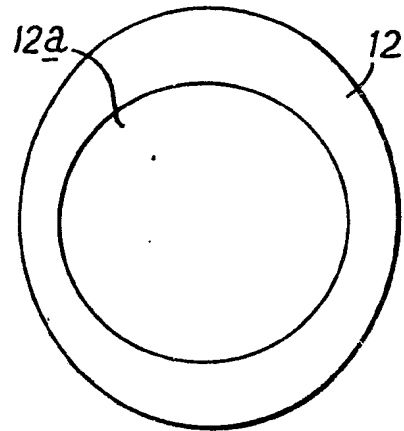


FIG. 3

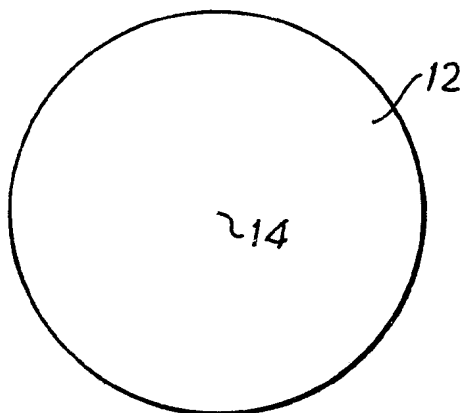
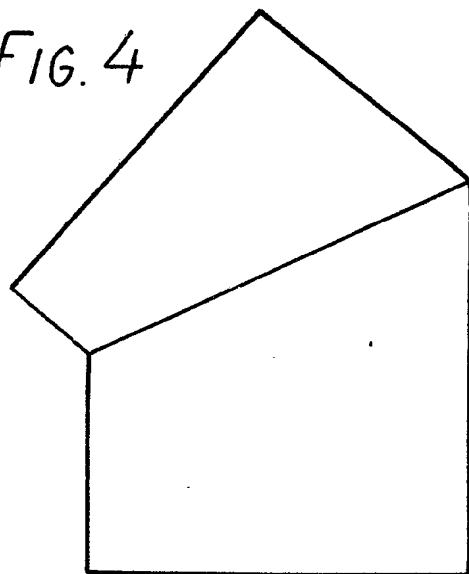
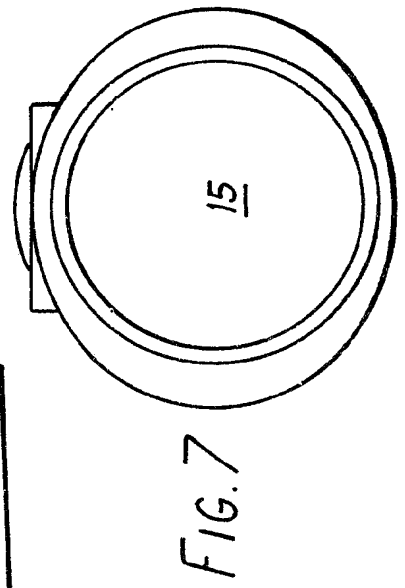
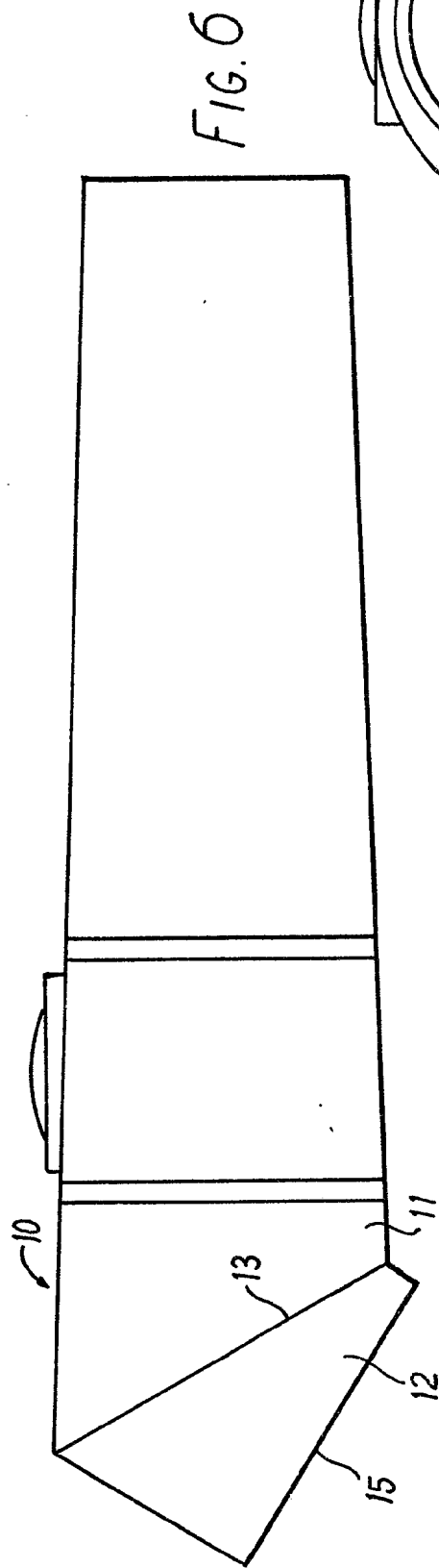
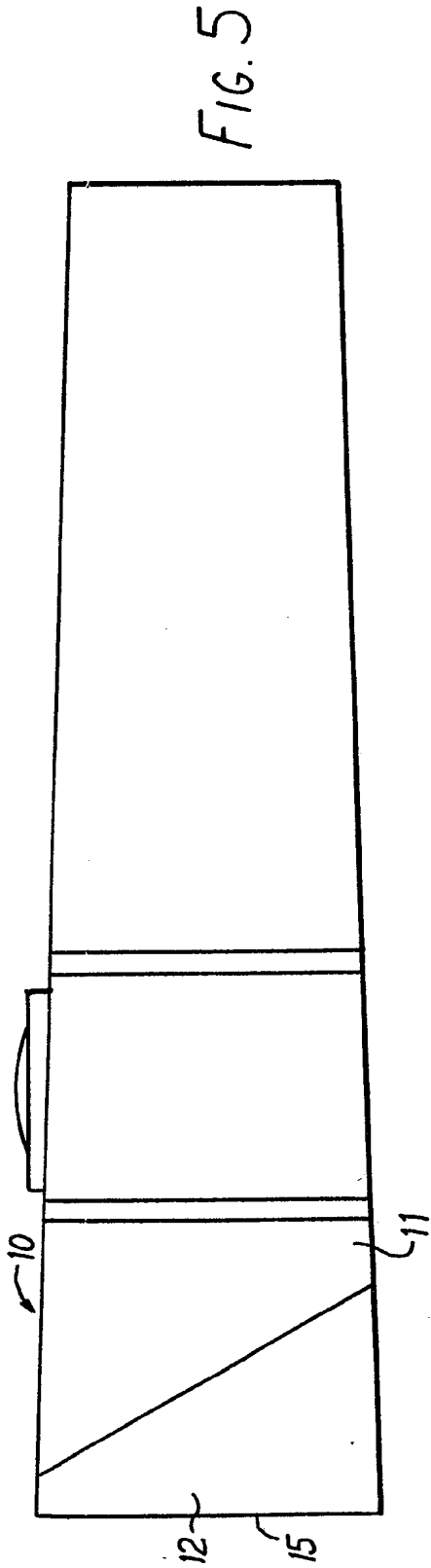


FIG. 4





# SPECIFICATION

## Improvements Relating to Lanterns, Torches and Other Lights

This invention relates to lanterns, torches and other lights.

According to this invention there is provided a lantern, torch or other light comprising a body portion, and a light emitting portion which carries a reflector encircling an electric bulb and which has a joint section whereby the light emitting section is connected to the body portion and at least the part of which adjoining the joint section is in the form of an elliptical cylinder, said joint section being inclined with respect to the lengthwise axis of the cylinder at an angle such as to have a circular outline, and the light emitting portion being mounted on the body portion for rotation relative to the body portion about an axis normal to the plane defined by said circular outline.

By thus rotating the light-emitting portion relative to the body portion, the direction of the emergent light beam can be altered.

In preferred arrangements according to the invention, the electric bulb is carried by the light emitting portion.

The body portion may be in the form of an elliptical cylinder of the same cross-section as that of the light-emitting portion and have a joint section inclined with respect to the lengthwise axis at the same angle as that of the light-emitting portion is inclined with respect to the lengthwise axis of the elliptical cylinder of the light-emitting portion. In such a construction it is possible so to arrange it that the lengthwise axes of the two portions can be brought into a colinear relationship.

Where the light is battery-operated, the body portion may conveniently house the battery (or one or more batteries, as the case may be), and carry the operating switch.

The invention will now be described in more detail with reference by way of example to the accompanying drawings in which:

Figure 1 shows a diagrammatic side view of light according to the invention,

Figure 2 is an end view corresponding to Figure 1,

Figure 3 is a sectional view on the plane 3—3 of Figure 1,

Figure 4 shows the light of Figure 1 with its two portions in another position of relative rotation, and

Figures 5, 6 and 7 are respectively two side views and front end views of a torch according to the invention, the front light-emitting portion being shown in different positions of adjustment in the two side views.

Referring first to Figures 1 to 4, the light shown comprises a body portion 11 and a light-emitting portion 12 which are of identical elliptical cross-section viewed along their lengthwise axes. The two portions are axially joined together substantially end to end on a joint

section plane 13 which contains the major axis of the ellipse but is inclined to the lengthwise axis of each of the portions at an angle  $\alpha$  such that, viewed normally to the plane, the shape of the abutting faces at the joint is circular as shown in the sectional view, Figure 3. The two portions are relatively rotatable about an axis 14 which extends through the centre of the circular faces and which is normal to the plane 13 of the faces, and such rotation alters the direction of the light emitted by the portion 12.

The light-emitting front portion 12 has a circular front lens 12a and carries within it, behind the lens, a reflector and an electric bulb holder and bulb (not shown). Batteries for the bulb are accommodated in the body portion 11, which also carries an on/off switch (not shown). The bulb-holder may be connected in circuit with the batteries and switch by conductor wires, and in this case means is provided for limiting the angle of relative rotation of the two portions to substantially 180°, such as to enable them to be moved into the positions of colinearity and maximum relative inclination as illustrated in Figures 1 and 4 respectively.

Figures 5 to 7 show a torch or flashlight embodying the invention, corresponding components being indicated by the same reference numerals as in Figures 1 to 4. In this instance the front portion 12 has a circular lens 12a mounted in its front face.

It will be understood that the invention can be used in any type of lantern, flashlight or light, including wall lights and free-standing lights, whether operated by batteries or by mains electricity.

## Claims

1. A lantern, torch or other lamp comprising a body portion, and a light emitting portion which carries within it a reflector encircling an electric bulb, the body portion and light portion being connected together at a joint section extending in a plane which is inclined to the axis of symmetry of the reflector, the body portion and light portion being circular in cross-section in the plane of said joint section, and the light portion being rotatable relative to the body portion about the centre of the circular joint section.

2. A lamp as claimed in claim 1, wherein the electric bulb is carried by the light emitting portion.

3. A lamp as claimed in claim 1 or claim 2, wherein the light emitting portion is of substantially elliptical in cross-section at right angles to the axis of symmetry of the reflector.

4. A lamp as claimed in claim 3, wherein the body portion is of cylindrical form and, at least in the region thereof adjoining the joint section, is elliptical in cross-section at right angles to the lengthwise axis of the body portion, said plane of the joint section being inclined to the lengthwise axis of the body portion.

5. A lamp as claimed in claim 4, wherein the angles of inclination of the axis of symmetry of

the reflector and the lengthwise axis of the body portion to the plane of the joint section are equal.

6. A lamp as claimed in any one of claims 1 to 5, wherein the body section is arranged to house one or more batteries to energise the bulb and

carries an on/off switch.

7. A lamp substantially as hereinbefore described with reference to and as illustrated in Figures 5 to 7 of the drawings.